

ABSTRACT OF THE DISCLOSURE

[0035] A system and method for providing adaptive threshold selection for detecting a signal in the presence of interference or noise. The system and method thus enables a node, such as a mobile user terminal, in an ad-hoc communications network to reduce the number of false alarms it experiences in the detection of communications signals due to, for example, sudden noise bursts or reception of a high powered signal that overloads the automatic gain control (AGC) device of the receiver in the node. The system and method employ two correlation circuits which correlate the received signal with two reference sequences and output a correlated signal, a threshold generating circuit which generates a threshold value based on the estimation of the variance of the output of the first correlation circuit, and a comparison circuit which compares the correlated signal to the threshold value to determine whether the received signal includes a valid data signal, as opposed to only noise.